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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/511,369

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Ercan Ferit Gigi

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PHILIPS INTELLECTUAL PROPERTY & STANDARDS

P.O. BOX 3001

BRIARCLIFF MANOR, NY 10510

EXAMINER

ARMSTRONG, ANGELA A

ART UNIT

PAPER NUMBER

2626

MAIL DATE

DELIVERY MODE

06/05/2009

PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No. 10/511,369	Applicant(s) GIGI, ERCAN FERIT	
	Examiner ANGELA A. ARMSTRONG	Art Unit 2626	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 09 March 2009.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-20 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-20 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

This Office Action is in response to the amendment filed March 9, 2009, amending claims 1-2, 4, 10-12, 14, 18, and 20. Claims 1-20 are pending.

Claim Rejections - 35 USC § 101

1. 35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

Claims 1-20 are rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter.

Claims 1-9 are rejected under 35 U.S.C. 101 because they merely manipulate an abstract idea without a claimed limitation to a practical application. The claimed invention, a series of steps to be performed on a computer, simply manipulates an abstract idea without a claimed limitation to the practical application, where practical application may be shown by a) physical transformation or b) a useful, concrete and tangible result.

Claim 10 is rejected under 35 USC 101 as being directed to non-statutory subject matter. The specification only discloses software embodiments of the invention making the computer program product just a computer program. A computer program does not fall within one of the statutory classes of invention under 35 USC 101, and thus claim 10 is directed to non-statutory subject matter.

Claims 11-17 are rejected under 35 USC 101 as being directed to non-statutory subject matter. The specification only discloses software embodiments of the invention. The device recites various means for limitations, which, as disclosed in the specification amount to a

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computer program. A computer program does not fall within one of the statutory classes of invention under 35 USC 101, and thus claims 11-17 are directed to non-statutory subject matter.

Claims 18-20 are rejected under 35 USC 101 as being directed to non-statutory subject matter. The specification only discloses software embodiments of the invention. The system recites various means for limitations, which, as disclosed in the specification amount to a computer program. A computer program does not fall within one of the statutory classes of invention under 35 USC 101, and thus claims 11-17 are directed to non-statutory subject matter.

Claim Rejections - 35 USC § 102

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

3. Claims 1-20 are rejected under 35 U.S.C. 102(b) as being anticipated by Gigi (WO 99/59139).

4. Regarding claims 1 and 11, Gigi discloses a method operable in a computer system (Figure 1) and device (page 19, lines 8-15) for analyzing of speech, the method comprising the steps of: inputting of a speech signal (page 5, lines 27-30), obtaining of the first harmonic of the speech signal (page 6, line 6 to page 7, line 12), determining of the phase-difference between the speech signal and the first harmonic (page 6, line 6 to page 7, line 12; page 12, line 30 to page 13, line 22) for centering a windowing function, wherein said phase difference is determined

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between a maximum of said speech signal and a phase zero of the first harmonic of the speech signal (page 13, line 1 to page 14, line 8).

5. Regarding claims 2 and 12, Gigi discloses determining the location of a maximum of the speech signal, (page 9, line 12 to page 14, line 8).

6. Regarding claims 3 and 13, Gigi discloses the speech signal is a diphone signal (page 5, line 30)

7. Regarding claims 4 and 14, Gigi discloses a method operable in a computer system (Figure 1) and device (page 19, lines 8-15) for synthesizing speech (page 7, line 27), the method comprising the steps of: selecting of windowed diphone samples the diphone samples being windowed by a window function being centered with respect to a phase angle which is determined by a phase difference between a maximum said speech signal and a zero crossing of a first harmonic of the speech signal (page 8, line 12 to page 9, line 29; page 12, lines 3-27, page 13, line 1 to page 14, line 8), concatenating the selected windowed diphone samples (page 7, lines 27-30).

8. Regarding claims 5 and 15, Gigi discloses the speech signal is a diphone signal (page 5, line 30).

9. Regarding claims 6, 16 and 19, Gigi discloses the window function being a cosine window (page 8, line 34).

10. Regarding claims 7 and 17, Gigi discloses implementing information indicative of diphones and pitch contour (page 7, lines 30-32).

11. Regarding claims 8 and 18, Gigi discloses implementation for text-to-speech (page 8, lines 1-2).

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12. Regarding claims 9 and 20, Gigi discloses inputting speech (page 5, lines 27-30) and windowing the speech to obtain windowed diphone segments (page 8, line 12 to page 9, line 24).

13. Regarding claim 10, Gigi disclose a computer program product (page 19, lines 14-32).

Response to Arguments

14. Applicant's arguments filed March 9, 2009, have been fully considered but they are not persuasive.

15. As per the rejections of claims 1, 4, and 10 under 35 USC 101, although applicant has amended the claims to recite a computer system for executing steps of the method, the methods still only manipulates an abstract idea without a claimed limitation to the practical application, where practical application may be shown by a) physical transformation or b) a useful, concrete and tangible result.

As per the rejections of claims 11-17 and 18-20 under 35 USC 101, applicant argues the specification provides for a computer being programmed to implement the invention. In response the Examiner argues, the recited apparatus or device limitations are only nominally claimed, as neither the claims nor the specification provides specific elements or specialized machines for specifically performing any of the recited steps. Additionally, since the specification specifically indicates the invention is implemented by a programming a computer without a description of additional computer elements, the invention is directed to only software, and is thus non-statutory. Accordingly, the rejection under 35 USC 101 is maintained.

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Applicant argues Gigi fails to disclose determining a difference between the maximum and a zero-crossing of a first derivative for centering a windowing function. The Examiner cannot concur. Gigi discloses determining phase differences and detecting maximum and zero-crossing of harmonic at page 8, line 12 to page 9, line 29; page 12, lines 3-27, page 13, line 1 to page 14, line 8.

Conclusion

16. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to ANGELA A. ARMSTRONG whose telephone number is (571)272-7598. The examiner can normally be reached on Monday-Thursday 11:30-8:00 PM.

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If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Richemond Dorvil can be reached on 571-272-7602. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Angela A Armstrong/
Primary Examiner, Art Unit 2626